

Historic, archived document

Do not assume content reflects current scientific knowledge, policies, or practices.

84 F cop 1.
U. S. DEPARTMENT OF AGRICULTURE

Farmers' Bulletin 1136 rev. May 1921

1922

BAKING IN THE HOME



MUCH OF THE BAKING in this country is done in the homes, and many housewives are desirous of knowing how to make not only really good yeast bread but also quick breads, pastry, etc. Many persons have learned to enjoy breads and other baked products not made entirely of wheat flour and wish to continue their use. Almost every section of the country produces abundant crops other than wheat, such as corn, rye, barley, buckwheat, rice, potatoes, sorghum grains, and others, which may well be utilized in baking. An increased local consumption of such crops would mean a saving to the community as well as to the country at large, and would lessen unnecessary transportation.

To enable the housewife to make a great variety of breads and other articles of other substances as well as of wheat, the following recipes and directions have been prepared.

Contribution from the States Relations Service

A. C. TRUE, Director

Washington, D. C.

Issued December, 1920
Revised May, 1921
Reprint, April, 1922

BAKING IN THE HOME.

HANNAH L. WESSLING,

Assistant in Home Demonstration Work, Office of Extension Work South.

WITH THE COOPERATION OF THE OFFICE OF HOME ECONOMICS.

CONTENTS.

	Page.		Page.
Yeast breads.....	4	Quick or hot breads.....	21
General considerations.....	4	Biscuits.....	22
Methods for making bread.....	7	Muffins and gems.....	24
Light rolls.....	16	Griddle cakes and the like.....	30
Sweet or fancy rolls.....	18	Pastry.....	33
Scoring bread.....	19	Uses for left-over pastry.....	36
		Cookies.....	37



HERE is no other single article of food that is as frequently placed on the table or takes as prominent a place in the average diet as bread. In some form or other it is served at practically every meal, and many times bread is the chief article of the meal. Properly balanced with milk, butter, fruits, vegetables both leafy and fleshy, eggs, cheese, or a little meat, bread may well form a considerable part of our daily food. Bread and other cereal products are also among the least expensive of our foods.

As it occupies so prominent a place in the diet, bread ought certainly to be well made, well baked, and properly cared for. Moreover, any girl or woman who desires to be known as a really good cook, will wish to excel particularly in bread making. An ideal loaf of bread is attractive in appearance; crust smooth, tender, and golden brown in color; the loaf itself light and well-rounded on top; the crumb spongy and tender; and the whole delicious in flavor.

Many housewives who do not care to bake yeast bread frequently prepare "hot" or "quick" breads for the home table. It is well, therefore, to emphasize the desirable characteristics of quick breads also, in order that these, too, may be as well made and well baked as possible. Hot breads, because of their freshness and softness, are often swallowed hurriedly and without thorough mastication,

hence it is especially important that thorough baking, lightness, and porosity should be sought in their preparation, as well as good flavor and attractive appearance.

Although wheat is the leading bread cereal in this country and wheat flour the flour of prime importance, housewives have learned that many desirable products may be made from meals of other substances or from a mixture of these with wheat flour. This country has a considerable number of products which may be thus used, such as corn, rye, oats, buckwheat, barley, rice, feterita, milo maize, potatoes, peanuts, soy-bean meal, and the flour made from peanut and soy-bean press cake. The local use of these products where they occur in quantity will be of great economic value by saving a large amount of unnecessary transportation of food materials.

The following directions and recipes deal not only with articles made from wheat alone but also with those into which other products enter. All measurements are *level*.

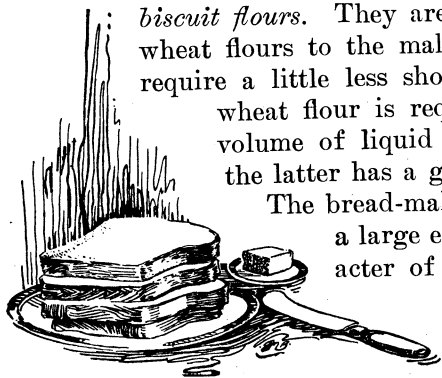
YEAST BREADS.

GENERAL CONSIDERATIONS.

Cleanliness.—To assure success in bread making it is important to maintain absolute cleanliness with regard to the materials used, as well as the utensils and the hands. Do not put the fingers unnecessarily into food materials nor handle them when it can be avoided. It is better to place your hand on the outside of the cup or pan in which the liquid is cooling to test its warmth, or to let one or two drops of the same fall onto your hand or wrist than to plunge your finger, nail and all, into the liquid.

Flour.—The flour should be sound and free from foreign taste or odor. Hard-wheat flours, made from spring wheat or hard winter wheat, are often known as *bread flours* and usually produce a somewhat larger and more spongy loaf. Soft-wheat flours are made from soft winter wheats and are known as *pastry* or *biscuit flours*. They are better adapted than are hard-wheat flours to the making of quick breads, and they require a little less shortening. Somewhat more soft-wheat flour is required to combine with a given volume of liquid than hard-wheat flour, because the latter has a greater water-absorbing capacity.

The bread-making quality of flour depends to a large extent upon the amount and character of the gluten it contains. Gluten is the elastic, gum-like substance obtained when flour is moistened and allowed to



stand for a while and which makes the dough pliable and tenacious. There is more gluten in wheat than in any other cereal, and it is of such a character that wheat flour yields a lighter and more springy bread than any other kind of flour. Hard-wheat flours are superior in this respect to soft-wheat flours and are therefore better adapted to the making of yeast breads.

Hard-wheat flour feels slightly gritty when rubbed between the fingers. When pressed tightly in the hand, it does not retain the imprint of the fingers very long and when shaken briskly soon falls to powder. The spring wheats are grown in the Northern Plains section of this country, e. g., Minnesota, the Dakotas, and parts of Montana. The hard winter wheats are produced in the section which includes Kansas, Nebraska, Oklahoma, and northern Texas.

Soft-wheat flour feels very soft and smooth when rubbed between the fingers; it retains the imprint of the fingers and does not fall to powder very readily after compression. The soft wheats are found very generally in the South, in the States east and south of Lake Michigan, and in some of the far Western States, particularly on the Pacific coast.

In some sections of the country, especially in the region including Indiana, Ohio, Kentucky, Pennsylvania, and other States, many millers blend the locally grown soft-wheat flour with a certain proportion of a hard winter or spring wheat flour. This blended flour is often referred to as "an all-around flour," producing better yeast bread than does soft-wheat flour alone, and yielding very good biscuits and other baking-powder products.

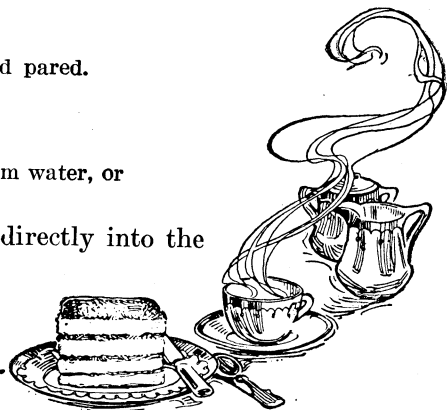
Yeast.—Compressed yeast, if used, should be as fresh as possible and free from any odor other than the well-known yeasty odor. It should be fairly soft, but should break easily. It should never be mixed with any liquid which is more than lukewarm.

Liquid yeast should always be kept covered and in a cool place. It should have a yeasty odor only and should not be kept more than two weeks without freshening.

LIQUID YEAST.¹

- 4 medium-sized potatoes, washed and pared.
- 1 quart hot water.
- $\frac{1}{4}$ cup sugar.
- 1 teaspoon salt.
- 1 cake dry yeast soaked in $\frac{1}{4}$ cup warm water, or
- 1 cake compressed yeast.

Grate or grind the potatoes directly into the water (a food grinder is convenient for the purpose). Boil about 5 minutes, stirring constantly. Add the sugar and



¹ See Farmers' Bul. 807, p. 9.

salt and allow the mixture to cool. When lukewarm, add the yeast. Keep at ordinary room temperature (about 70° F.) for 24 hours, when it will be ready for use. This yeast should be kept in a cool, dark place. An earthen jar or enamel-ware pail is a good container for it and should be scalded before the yeast is put into it.

Dry yeast is a very convenient form, especially for rural housewives who find it difficult to obtain fresh compressed yeast and have not always the means of keeping liquid yeast sufficiently cold. Dry yeast should always be soaked in lukewarm water for 20 minutes to 1 hour before mixing. It may then be used at once in a sponge or dough or may serve in the preparation of a potato ferment to be used in making bread by the short process.

Potato ferment.—Cook until soft 1 medium large potato previously washed and pared. Put through a sieve or ricer and return the mashed potato to the water in which it was boiled. Make up to 1 quart. Add 1 teaspoon salt, 1 tablespoon sugar, and cool until lukewarm. Then add 1 cake yeast (dry or compressed) previously softened with a little lukewarm water. Cover and set aside in a moderately warm place (80° F.) for about 12 hours. This entire ferment is used as the liquid for making bread by the quick process, being sufficient for 4 loaves.

Liquid.—The liquid used in bread making may be whole milk, skim milk, water, whey, the water in which pared potatoes have been cooked, or combinations of these liquids.

If milk be used it should be scalded and cooled until lukewarm; that is, its temperature should be between 80° and 90° F. before adding it to the dough. The use of milk increases the food value somewhat and gives to the loaf a desirable tenderness and richness, besides keeping it moist longer than does water alone.

A small amount of potato water or mashed potato added to the sponge or dough will hasten the fermentation appreciably, and the resulting bread will remain moist longer than ordinarily.

Temperature.—A sponge set at night should be kept at ordinary room temperature or less (60° to 75° F.), depending upon how long it is to stand. If the "straight-dough method" is used, or a *dough* (not a sponge) has been prepared, the temperature should be fairly warm (80° to 88° F.), unless the dough is to stand a long time, as overnight. The time for rising required in the following recipes depends upon such temperature being maintained.

Crust on dough.—The dough should always be kept covered with a lid or plate, in order to prevent surface evaporation resulting in the formation of a crust on the dough. When thus covered it is unnecessary to grease the surface of the dough.

Indicator.—When molding the loaves a bit of dough should be pinched off, shaped into a ball, and placed in a small jelly glass. Its

volume when placed in the glass should be noted and the glass marked at twice and three times this volume. This "indicator" should stand alongside the pans while the loaves are rising. If spring or hard winter wheat flours alone are used in bread making, the loaves should be placed in the oven when the dough in the indicator rises to three times the original volume. If soft winter wheat flour is used, the loaves are ready for baking when the indicator shows about twice the original volume. When the loaves are ready for the oven place the ball of dough in a small greased tin, let stand about 15 minutes, then bake it while the loaves are still in the oven.

Pan.—For a so-called "standard" homemade loaf, one cup liquid and usually from three to four cups wheat flour are required. The exact amount of flour for a given amount of liquid (or vice versa) can not be given in these recipes, because there is so much variation in this respect among different flours, and even in the same flour at different times. A suitable pan for this amount of dough should hold 3 pints, and would be approximately $7\frac{1}{2}$ inches long, $3\frac{1}{2}$ inches wide, and 3 inches deep. Bake loaves of this size about 50 minutes.

Temperature of the oven.—When the dough is fully risen for baking, i. e., has increased from two to three times its bulk, depending upon the kind of flour, it should be put into a fairly hot oven at first (400° to 425° F.), in order that the crust may begin to form before it becomes overrisen at the top. If a dough must be baked before it is fully risen, it should be put into a cooler oven (350° to 375° F.), in order to give it a chance to rise fully before the crust forms and thus prevent an unsightly crack across the top or at the side of the loaf. After this rising in the oven has taken place the heat should be increased to 400° or 425° F., and later lowered again if necessary.

Testing heat of the oven.—The best method of testing the heat of the oven is by means of an oven thermometer.² When no thermometer is at hand the following test may be used: Place $\frac{1}{2}$ teaspoon of flour in a small tin like the lid of a jelly glass, spreading it in a layer about $\frac{1}{4}$ inch thick. Place this in the oven, and if the heat is right for bread baking the flour will become light golden brown throughout within five minutes.

METHODS FOR MAKING BREAD.

There are two general methods for making bread, one known as the "straight-dough" process and the other as the "sponge" process.

Straight-dough process.—In the "straight-dough" process all the ingredients are mixed at one time and the dough is made of the proper consistency before rising.

Sponge process.—In the "sponge" process only half the total amount of flour is used at first, with all or nearly all of the liquid,

² Oven thermometers may be obtained from manufacturers or dealers in scientific instruments. The thermometer which accompanies most fireless cookers will serve very well.

the yeast, and frequently the salt and the sugar. Compressed, dry, or liquid yeast may be used for this. This mixture is similar to a soft batter, and after the first rising the remainder of the flour, the shortening, and any other desired ingredients are added. It is then kneaded until of the proper consistency and smoothness.

The sponge process usually requires less yeast than the straight-dough method, because of the softer consistency of the mixture which facilitates the growth of the yeast. However, by using larger or smaller amounts of yeast one may shorten or lengthen the time required for rising. In a similar way the straight-dough process may be shortened or lengthened by increasing or decreasing the amount of yeast used. Hence, recipes for the different variations of time are given and the housewife may select that which suits her convenience as to time and the kind of yeast she has on hand, or which seems to her most economical. Great care should be taken when using a sponge or dough which stands a long time—as, for example, the “overnight straight dough” or the “overnight sponge”—to keep it much cooler than when the quicker methods are used, since the former have a greater chance of becoming sour.

For the convenience of extension workers or others who need to make a small quantity of bread at a time for demonstration purposes, a recipe of one loaf is included as well as that for four loaves, which may be regarded as an average baking for a family.

SHORT PROCESS OR STRAIGHT DOUGH.

(One loaf.)

1 cup lukewarm liquid.	$\frac{1}{4}$ to $\frac{1}{2}$ cake compressed yeast, or
1 teaspoon salt.	2 to 4 tablespoons liquid yeast, or
$\frac{1}{2}$ tablespoon sugar.	1 cup potato ferment.
$\frac{1}{2}$ tablespoon shortening, if desired.	3 to 4 cups sifted flour.

(Four loaves.)

4 cups (1 quart) lukewarm liquid.	1 or 2 cakes compressed yeast, or
4 teaspoons salt.	$\frac{1}{2}$ to 1 cup liquid yeast, or
2 tablespoons sugar.	4 cups potato ferment.
2 tablespoons shortening, if desired.	3 to 4 quarts sifted flour.

If milk is used it should be scalded and cooled until lukewarm before using. When liquid yeast or potato ferment is used its volume must be deducted from the other liquid called for.

Mixing.—Soften the yeast with a small amount of the lukewarm liquid. To the rest of the liquid add the salt, sugar, and shortening. Add the yeast and mix all together. Measure the sifted flour into a bowl and blend with the liquid. If too soft to knead, add more flour until of the proper consistency. Knead 5 to 10 minutes or until smooth, elastic, and no longer sticky. Cover with a lid or plate and place where it will be away from drafts and at a uniform tem-

perature of 80° to 88° F. Let rise until about double its original bulk or until a slight touch of the finger leaves an impression. This should happen within 1 to 2 hours if the yeast is in good condition and the temperature right.

Kneading.—Cut down the dough from the sides of the bowl and knead. Should the dough be too soft, add flour, a little at a time, kneading until it is smooth, elastic, and free from large gas bubbles. If the dough be too stiff, add a little water, working it in well, and knead until the dough no longer sticks to the fingers or bowl. Cover and set aside in the same warm place for an hour or an hour and a half, or until very light and at least double in bulk.

Molding.—Cut down the dough from the sides of the bowl and knead again to expel the large bubbles of gas. Divide into approxi-

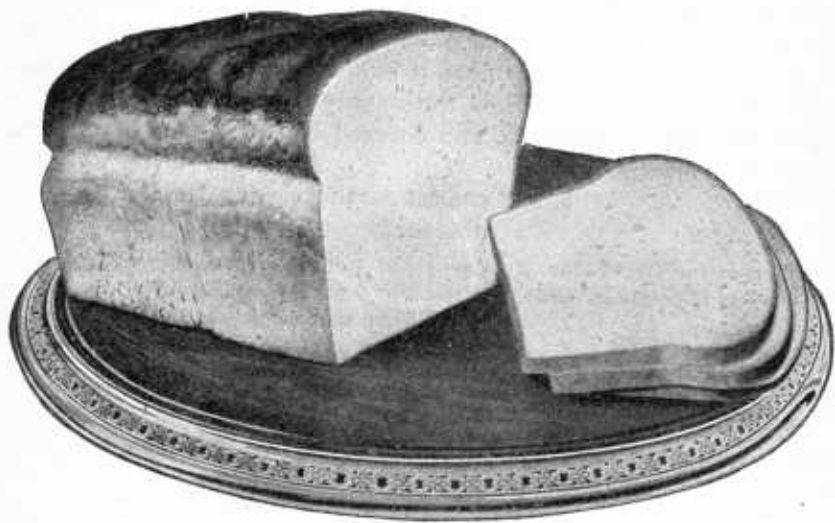


FIG. 1.—Bread made by the sponge process with dry yeast.

mately equal proportions; mold quickly, stretching the outside of the loaf and pinching together underneath; place, crease side down, in a lightly greased pan which has been warmed but is not hot. Cover and set the loaf in the same warm place and allow to rise 50 minutes to 1 hour, or until the indicator shows from $2\frac{1}{2}$ to 3 times the original volume, depending upon the kind of flour used. (See p. 6.)

Baking.—Loaves made with 1 cupful of liquid each should be baked 50 minutes if in separate pans, in an oven heat regulated as described. They should begin to brown in about 15 minutes. After that time, the temperature of the oven should be lowered gradually to 375° F., so that the crust will not become too hard.

It is better to place the pans in the oven not touching each other, so that the air will circulate around them. Unless the oven bakes very evenly, it will be necessary to turn the pans around occasionally, or to change their position, in order to have loaves of good shape.

Bread is done when it shrinks from the pan; when the under crust and the edges of the upper crust rebound if pressed back by the finger instead of becoming permanently dented; when it makes a singing sound perceptible if the ear is placed very close to the loaf. Surest of all is an old test, the use of a probe which is run into the center of the loaf and which should come out clean. This test is not really necessary, however, and the probe used must be perfectly clean, and never should be a dirty broom straw. Clean straws from a new broom may be used or any others that are perfectly clean.

Cooling bread.—After baking, place the loaves on a cooling rack or else across the edges of the pans and allow to cool thoroughly. Do not cover while cooling unless it is necessary to prevent contamination by dust or flies. When thoroughly cool, place the loaves in a perfectly clean, well-aired, and covered box of tin or aluminum, or in a stone crock.

SHORT SPONGE METHOD.

(One loaf.)

1 cup lukewarm liquid (or 2 table- spoons less if potato is used).	$\frac{1}{4}$ to $\frac{1}{2}$ cake compressed yeast, or
1 teaspoon salt.	2 to 4 tablespoons liquid yeast.
$\frac{1}{2}$ tablespoon sugar.	$\frac{1}{4}$ cup mashed potato (if desired).
$\frac{1}{2}$ tablespoon shortening (if desired).	3 to 4 cups sifted flour.

(Four loaves.)

4 cups (1 quart) lukewarm liquid (or $\frac{1}{2}$ cup less if potato is used).	1 or 2 cakes compressed yeast, or
4 teaspoons salt.	$\frac{1}{2}$ to 1 cup liquid yeast.
2 tablespoons sugar.	1 cup mashed potato (if desired).
2 tablespoons shortening (if desired).	3 to 4 quarts sifted flour.

Mixing.—Soften the yeast with a small amount of the lukewarm liquid; to the rest of the liquid add the salt and sugar, mix this with the cool potato and add the softened yeast. Measure half the required amount of flour into a bowl and blend with this the yeast mixture. Beat thoroughly until smooth. Cover and set to rise in a moderately warm place (80° to 88° F.) When liquid yeast is used its volume must be deducted from the other liquid called for.

Kneading.—When quite light and full of bubbles, or after 1 to $1\frac{1}{2}$ hours if the yeast is good, break up this sponge, add the melted shortening (if used) and the rest of the flour or enough to make a dough that can be kneaded. Knead until the dough is smooth and elastic and no longer sticks to the bowl or fingers. Cover and set aside again to rise.

Molding and baking.—When the dough has become very light and at least double in bulk, follow directions for molding and baking given under “short process,” page 9.

OVERNIGHT SPONGE METHOD.

(One loaf.)

1 cup lukewarm liquid (or 2 table- spoons less if potato is used).	½ cake yeast (dry or compressed) or 2 tablespoons liquid yeast.
1 teaspoon salt.	½ cup mashed potato (if desired).
½ tablespoon sugar.	3 to 4 cups sifted flour.
½ tablespoon shortening (if desired).	

(Four loaves.)

4 cups (1 quart) lukewarm liquid (½ cup less if potato is used).	1 cake yeast (dry or compressed), or ½ cup liquid yeast.
4 teaspoons salt.	1 cup mashed potato (if desired).
2 tablespoons sugar.	3 to 4 quarts sifted flour.
2 tablespoons shortening (if desired).	

If *dry* yeast is used, soak it 20 minutes to 1 hour before mixing the sponge and mix the sponge earlier than if compressed or liquid yeast is used. When liquid yeast is used its volume must be deducted from the other liquid called for.

Mixing.—Blend the yeast with a little of the lukewarm liquid. If potato is used add to it the salt, then the yeast mixture, the remainder of the liquid, and finally one-half of the flour. Beat until smooth, cover, and set to rise where it will be at 60° to 70° F.

Kneading.—In the morning break up the sponge, add sugar, the melted shortening (if used), and enough flour to make a dough of the proper consistency. Knead until the dough is smooth, elastic, and no longer sticks to the bowl or fingers. Cover and set to rise until at least double in bulk.

Molding and baking.—See directions for molding and baking under “short process,” page 9.

OVERNIGHT STRAIGHT-DOUGH METHOD.

(One loaf.)

1 cup lukewarm liquid (or 2 table- spoons less if potato is used).	½ cake yeast (dry or compressed), or 2 tablespoons liquid yeast.
1 teaspoon salt.	½ cup mashed potato (if desired).
½ tablespoon sugar.	3 to 4 cups sifted flour.
½ tablespoon shortening if desired.	

(Four loaves.)

4 cups lukewarm liquid (1 quart) (½ cup less if potato is used).	1 cake yeast (dry or compressed), or ½ cup liquid yeast.
4 teaspoons salt.	1 cup mashed potato (if desired).
2 tablespoons sugar.	3 to 4 quarts sifted flour.
2 tablespoons shortening (if desired).	

Mixing and kneading.—When liquid yeast is used its volume must be deducted from the other liquid called for. If *dry* yeast is used, soak it 20 minutes or more, with part of the liquid, before mixing.

Follow directions for mixing under "short process," page 8, using the mashed potato, if desired, and the amount of yeast suggested above. Mix and knead at night, cover and keep between 60° and 75° F. overnight.

Molding and baking.—When the dough has become very light and at least double in bulk, follow directions for molding and baking given under "short process," page 9.

GRAHAM OR WHOLE-WHEAT BREAD.

(One loaf.)

3 cups or more graham flour or wheat meal.	1 or 2 tablespoons sweetening.
1½ cups lukewarm liquid.	½ to ½ cake yeast (dry or compressed),
1 teaspoon salt.	or 2 to 4 tablespoons liquid yeast (deduct from other liquid).

Short process.—Dissolve the salt and sweetening in 1 cup lukewarm liquid, and to this add ½ cake compressed yeast blended with ¼ cup lukewarm water (or 4 tablespoons liquid yeast). Mix with this sufficient graham flour to form a dough not too stiff. Knead until smooth and elastic. Cover and allow to rise until quite light (at least double in bulk). Knead down, mold, place in greased pan, and allow to rise until just double in volume. Bake at least one hour in a moderately hot oven. If desired, the dough may be allowed to rise twice before being molded for the pan. Whole-wheat dough must have less rising than that made with ordinary flour.

Long process.—Make a sponge of ¾ cup lukewarm liquid, 1 teaspoon salt, ⅙ cake yeast (dry or compressed) blended with ¼ cup lukewarm water, or 2 tablespoons liquid yeast, and 1½ cups graham flour. When dry yeast is used, it must be soaked in a portion of the liquid for 20 minutes to 1 hour before adding to the sponge. Cover and let rise overnight or until very light. In the morning break up this sponge, add ¼ cup liquid at about 90° F., the sweetening, and enough more graham flour to make a dough not too stiff. Knead until smooth and elastic. Mold and finish as directed above, or allow to rise a second time before molding. A satisfactory loaf of part graham may be made by using ½ or ⅓ white flour with the remainder graham. If the sponge process be used, make the sponge with the white flour and when kneading it stiff use the graham. This loaf will have more bulk than that made of graham flour alone and will be relatively lighter.

RAISIN BREAD.

(One loaf.)

- | | |
|---|---|
| 1 cup lukewarm liquid (preferably milk). | 2 to 4 tablespoons liquid yeast. |
| 1 teaspoon salt. | 3 to 4 cups sifted flour. |
| 2 tablespoons sugar. | $\frac{3}{4}$ cup seeded raisins. |
| 2 tablespoons shortening. | When liquid yeast is used, deduct amount of it from the rest of the liquid. |
| $\frac{1}{4}$ to $\frac{1}{2}$ cake yeast, or | |

Straight-dough method.—Mix the dough at night if the smaller amount of yeast is used, or in the morning if the larger amount is to be used, following directions given under "overnight straight dough," page 11, or the "short process," page 8. When the dough is ready for molding cut it down, add the raisins previously dredged with flour, knead them in well, form into loaf shape, and place in greased tin. When quite light according to the indicator, bake in moderate oven about 50 minutes.

Sponge method.—Make a sponge with 1 cup of liquid as described under "overnight sponge," page 11, if the smaller amount of yeast is used, or under "short sponge method," page 10, if the larger amount is to be used. When the dough has been kneaded stiff and has risen again add the raisins previously dredged with flour, kneading them in thoroughly. Shape into a loaf, place in greased tin, let rise until quite light according to the indicator, and bake in a moderate oven about 50 minutes.

If desired, the top of the loaf may be brushed with a solution of 1 teaspoon of sugar in $\frac{1}{2}$ cup of milk or hot water, immediately upon removal from the oven

A delicious raisin loaf is made by using one-half graham and one-half white flour in any of the above recipes.

PEANUT BREAD.

(One loaf.)

- | | |
|------------------------------------|--|
| 1 cup lukewarm liquid. | $\frac{1}{2}$ to $\frac{1}{2}$ cake yeast (dry or compressed), |
| 1 teaspoon salt. | or |
| 3 cups flour (more if necessary). | 2 to 4 tablespoons liquid yeast (deduct from other liquid). |
| 1 or 2 tablespoons sweetening. | |
| 1 cup peanut meal or peanut flour. | |

The peanut meal used in this bread may be prepared by shelling roasted peanuts, removing red skin, and crushing the nuts with a rolling pin or putting them through a food chopper. Peanut flour (such as may be purchased in some localities) is much improved in flavor if slightly parched before using. Place a portion of it in a shallow pan and heat carefully in the oven until light brown in color, stirring frequently to prevent scorching.

Short process.—Dissolve the salt and sweetening in the cup of lukewarm liquid. Mix with it the compressed yeast ($\frac{1}{2}$ cake) blended with a small portion of the liquid (or 4 tablespoons liquid yeast),

and add all to the mixture of flour and peanut meal. Knead until smooth and elastic, adding more flour or liquid, if necessary, to secure proper consistency. Cover and let rise until quite light. If desired, knead down and let rise a second time until very light. Then knead lightly, pinch off a bit for the indicator, mold the rest, place in greased pan, cover, and let rise until at least $2\frac{1}{2}$ times the original bulk. Bake 50 to 60 minutes in a moderately hot oven (400° F.).

Long process.—Make a sponge of $\frac{1}{2}$ cup lukewarm liquid, 1 teaspoon salt, $\frac{1}{8}$ cake yeast, dry or compressed, blended with $\frac{1}{4}$ cup lukewarm water (or 2 tablespoons liquid yeast), and $1\frac{1}{2}$ cups flour. Beat well, cover, and set aside where it will be between 60° and 70° F. if possible. When thoroughly light, add to this sponge $\frac{1}{4}$ cup water at about 90° F., to which has been added the sweetening and the mixture of peanut meal and $1\frac{1}{2}$ cups flour. Knead until smooth and elastic, adding more flour or liquid if necessary. Cover and set aside until light. Then knead down mold, and finish as directed under "short process" above.

Any other dry meal, or flour, obtained from corn, rice, kafir, milo, feterita, buckwheat, barley, finely ground rolled oats, millet, chick pea, navy beans, peas, chestnuts, bananas, dasheen, or cassava may be used in place of the peanut meal in the above recipe. Somewhat more liquid will probably be required with some of these meals than when peanut is used.

POTATO BREAD.

(One loaf.)

1 cup mashed sweet or Irish potatoes.	4 tablespoons lukewarm water (more if necessary).
1 teaspoon salt.	$2\frac{1}{2}$ cups or more sifted flour.
$\frac{1}{2}$ tablespoon sugar.	$\frac{1}{8}$ to $\frac{1}{4}$ cake yeast (dry or compressed),
$\frac{1}{2}$ tablespoon shortening, if desired.	or 2 to 4 tablespoons liquid yeast.

Use left-over boiled or baked potatoes, or boil potatoes in their skins until tender. Peel and mash the potatoes or put them through a colander or ricer to free them from lumps. If cold left-over potatoes are used, put them into boiling water for a few minutes, in order to facilitate the mashing or ricing process. When liquid yeast is used it must be included in the total liquid.

Short process.—To 1 cup of the cool mashed potato add 1 teaspoon salt, $\frac{1}{2}$ tablespoon sugar, the shortening (if used), and $\frac{1}{2}$ cake compressed yeast mixed with 4 tablespoons lukewarm water, or 4 tablespoons liquid yeast. Mix with this $\frac{1}{2}$ to 1 cup sifted flour, stirring until thoroughly blended. Cover and allow to rise until soft and light (about 2 hours). Knead in enough more flour to make a dough somewhat stiffer than for white bread. If the potatoes are rather dry or mealy, a little additional water may be required. Knead until smooth and elastic. Cover and let rise again until very light (about

1 hour). Then knead down, mold, and finish as usual. Allow to rise in the pan until $2\frac{1}{2}$ to 3 times the original bulk. Bake slowly in a moderate oven about 1 hour.

Long process.—To 1 cup of the cool mashed potatoes add 1 teaspoon salt and $\frac{1}{8}$ cake yeast, dry or compressed, mixed with 4 tablespoons lukewarm water, or 2 tablespoons liquid yeast and 2 of water. Add to this $\frac{1}{2}$ to 1 cup sifted flour, cover and set to rise where it will be between 60° and 70° F. When thoroughly light and soft add to it the sugar and shortening, and knead in enough more flour to form a smooth, elastic, and rather stiff dough. Cover and allow to rise again until very light. Then knead down, mold, and finish as directed under "short process" above.

Cooked or baked squash, pumpkin, peas, beans, or dasheen may be used in place of the potato.

RICE BREAD.

(One loaf.)

1 cup boiled rice.	4 tablespoons lukewarm water (more if necessary).
1 teaspoon salt.	$2\frac{1}{2}$ cups or more sifted flour.
$\frac{1}{2}$ tablespoon sugar.	$\frac{1}{8}$ to $\frac{1}{4}$ cake yeast (dry or compressed),
$\frac{1}{2}$ tablespoon shortening, if desired.	or 2 to 4 tablespoons liquid yeast.

Left-over rice may be used, or broken rice may be especially cooked for this purpose, using $\frac{1}{3}$ cup uncooked rice with 1 cup water for each loaf to be made. Cook rice until very tender, and, if desired, put it through a ricer or colander.

Follow directions given for potato bread, page 14, using cooked rice instead of the potato.

CORN-MEAL LIGHT BREAD.

(One loaf.)

1 cup corn-meal mush, cooked grits or fine hominy.	4 tablespoons lukewarm water (more if necessary).
1 teaspoon salt.	$2\frac{1}{2}$ cups or more sifted flour.
$\frac{1}{2}$ tablespoon sugar.	$\frac{1}{8}$ to $\frac{1}{4}$ cake yeast (dry or compressed),
$\frac{1}{2}$ tablespoon shortening, if desired.	or 2 to 4 tablespoons liquid yeast.

Use left-over mush, grits, or fine hominy, or prepare a mush of $\frac{3}{4}$ cup dry corn meal and $1\frac{1}{2}$ cups water. Cook 10 minutes to 1 hour in a double boiler, or in a vessel placed in another containing boiling water. Cool the mush until lukewarm, then follow directions given on page 14 for making potato bread, substituting corn-meal mush for the potato.

Any other cooked cereal, either prepared for this purpose or left-over portions, may be used in place of the corn-meal mush. If the cereal has been previously salted, use only $\frac{3}{8}$ teaspoon salt per loaf.

LIGHT ROLLS.

Sponge method.—To the sponge made with 1 cup of liquid (see directions for “short” or “overnight” sponge, pp. 10, 11), when light, add 2 tablespoons of melted shortening, 1 or 2 tablespoons of sweetening, and one well-beaten egg, if desired. Add enough flour to make a dough not too stiff. Let rise again, or shape at once into balls by rolling a bit of dough the size of an egg between the palms of the hands. Place close together or somewhat apart, depending on whether a soft or a crusty roll is desired. Let rise in the pan until trebled in bulk and bake about 25 to 35 minutes in a fairly hot oven. Parker House rolls are made by rolling the dough into a sheet $\frac{1}{2}$ inch thick, cutting into rounds, buttering lightly, and folding these over in the center. Let rise in pan and bake same as light rolls.

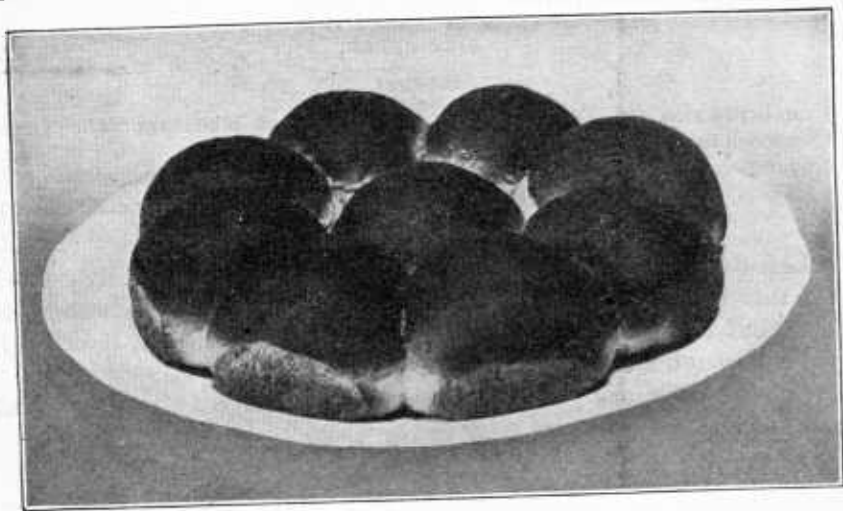


FIG. 2.—Plain light rolls.

Straight dough.—To a portion of dough equivalent to 1 loaf (or made with 1 cup liquid according to directions for “straight dough,” pp. 8, 11) add 2 tablespoons melted shortening and 1 or 2 tablespoons sugar. Knead until smooth and elastic, adding a little flour if necessary. Pinch off small portions of dough, shape into balls as described above, and place in pan with smooth side uppermost.

CLOVER-LEAF ROLLS.

When shaping the rolls pinch off quite small portions of dough about the size of a marble, roll between the palms of the hands, and place three together in each compartment or cup of ordinary gem pans, previously greased. The cups should be only half full. Let rise until treble in bulk and bake about 25 minutes in a fairly hot oven.

"4-H CLUB" ROLLS.

In the preceding directions four tiny balls of dough may be placed into each cup of the gem pans, forming a four-leaf clover roll, symbolic of the 4-H clubs.

GRAHAM-RYE ROLLS OR LOAF BREAD.

(Twelve rolls.)

1½ cups rye flour.	¼ to ½ cake yeast (dry or compressed), or 2 to 4 tablespoons liquid yeast.
1½ cups graham flour.	
1 teaspoon salt.	
1 or 2 tablespoons sweetening.	1 cup (or more) lukewarm water.
1 tablespoon shortening.	

When liquid yeast is used its volume must be deducted from the other liquid called for.

Make a sponge with the rye flour, the salt, yeast, and water. Let



FIG. 3.—Parker House rolls.

rise until very light. Break up the sponge, add the sweetening, the softened shortening, the graham flour and, if necessary, enough more liquid to make a spoon dough so stiff that it will barely drop from the spoon. Place the dough in greased gem pans, filling them half full, let rise until double in bulk, and bake 25 to 30 minutes in a medium hot oven.

By adding a little more rye or graham flour the dough may be made stiff enough to knead. Then let rise again, mold as loaf, let rise in pan until double in bulk, and bake at least one hour in a moderate oven.

GRAHAM-KAFIR ROLLS.

(Twelve rolls.)

2 cups graham flour.	1 teaspoon salt.
½ cup kafir flour.	1 or 2 tablespoons sweetening.
½ cup white flour.	1 tablespoon shortening (melted).
1 cup (or more) lukewarm liquid.	¼ to ½ cake yeast (dry or compressed), or 2 to 4 tablespoons liquid yeast.

When liquid yeast is used its volume must be deducted from the other liquid called for.

Make a sponge with 1 cup graham flour, $\frac{1}{2}$ cup white flour, 1 cup lukewarm liquid, the salt, and yeast. Cover and allow to rise until quite light. Break up this sponge, add to it the sweetening, the shortening, $\frac{1}{2}$ cup kafir flour, and the remaining cup graham flour. If necessary, add enough more liquid to form a soft dough (as for drop biscuits). Beat until smooth and drop at once into greased muffin pans (half full). Let rise until just double in bulk, then bake about 25 to 30 minutes in a moderate oven.

Other materials, such as corn flour, finely ground rolled oats, buckwheat, barley, feterita, or rice flour, may be used in place of the kafir.

RAISED MUFFINS.

(About 18 muffins.)

1 cup milk.
2 tablespoons lukewarm water.
1 teaspoon salt.
2 tablespoons sugar.
2 tablespoons shortening (melted).

1 egg.
 $\frac{1}{2}$ cake yeast or 4 tablespoons liquid yeast.
About 3 cups sifted flour.

The yeast cake must be softened in lukewarm water, or when liquid yeast is used its volume must be deducted from the other liquid called for.

Make a sponge as usual with the yeast, the milk scalded and cooled until lukewarm, the salt, sugar, and enough flour to make a soft batter. Beat thoroughly until smooth, cover, and let rise. When very light, or after about $1\frac{1}{2}$ to 2 hours, break up the sponge, add the melted shortening and the well-beaten egg, and enough more flour to make a "spoon dough." Beat well and drop into greased muffin pans; let rise until at least double in bulk, then bake about 25 minutes in a fairly hot oven.

RAISED COFFEE CAKE.

A portion of the dough prepared according to the preceding recipe may be spread in a greased shallow tin. Sprinkle with sugar and cinnamon, dot with bits of butter; allow to rise until quite light, and bake 15 to 20 minutes in a medium hot oven.

SWEET OR FANCY ROLLS.

Many variations in rolls may be had by shaping the dough into different forms—crescents, finger rolls, or twists, or by adding currants, raisins, chopped nuts, or sugar and cinnamon. The rolls may also be glazed with sugar dissolved in milk or with a thin icing of white of egg and sugar.

FINGER OR DINNER ROLLS.

Dainty dinner rolls are made from the dough for light rolls, when it is ready for molding, by pinching off pieces about the size of a small egg. Roll each piece between the palms of the hands until round, then roll with the hand on a board until 6 inches long and slightly tapering toward the ends. Place about 1 inch apart on a greased baking sheet. Let rise until trebled in bulk, brush with milk, and bake about 20 minutes in a fairly hot oven.

CRESCENTS.

Roll the balls of dough as described for finger rolls and when placing them on the baking sheet form them into crescents, pinching down the ends slightly to hold the shape. Let rise, brush with milk, and bake as described under finger rolls.

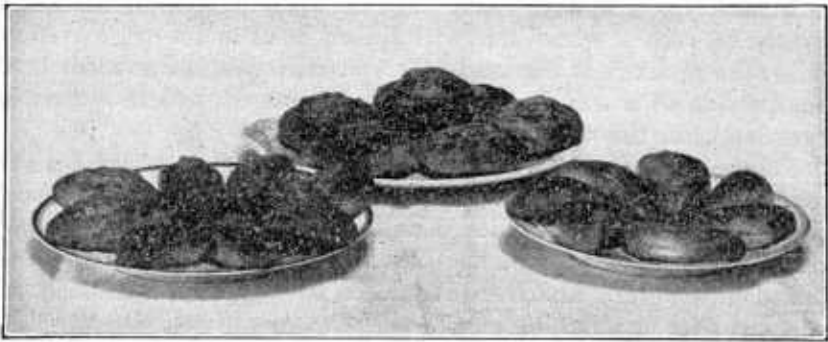


FIG. 4.—Fancy sweet rolls.

CURRANT OR CINNAMON BUNS.

Take a portion of dough for light rolls, when it is ready for molding, place on a floured bread board, and roll into a rectangular sheet one-half inch in thickness. Pin down the corners to keep in shape. Spread lightly with softened butter, sprinkle with powdered (or soft) sugar, and strew with currants or cinnamon. Roll up the sheet as for a jelly roll, cut into inch slices, and place on a greased sheet about 1 inch apart. Let rise until about trebled in bulk, sprinkle the top with chopped nuts, or brush with a mixture of sugar and milk, and bake about 25 minutes in a fairly hot oven. If desired, they may be baked without any top coating and iced just a few minutes before taking from the oven.

SCORING BREAD.

It is very helpful, especially for a beginner in the art of bread making, to know what the characteristics of a good loaf of bread are.

Appearance.—First of all, bread should be attractive in appearance. This requires that it should be of good shape, evenly rounded on top, with a smooth unbroken crust, having neither breaks nor bulges. It should be of a uniform golden brown color over the entire loaf.

Lightness.—It should be light, i. e., be relatively large for its weight. A loaf made with 1 cup of liquid will weigh about 18 to 20 ounces and should rise well above the top of a pan holding 3 pints.

Crust.—When the loaf is cut the crust should be found of even thickness over the entire loaf, not more than $\frac{1}{2}$ inch deep, and should be crisp and tender rather than hard and tough.

Color of crumb.—The crumb should be of a pale creamy tint with a satiny luster or sheen as one looks across the loaf, with no dark streaks or patches.

Texture.—The grain of the loaf should be fine and even, having many small cells, more or less uniform in size, rather than fewer cells of larger size. A good bread flour, properly handled during the process of bread making, will usually yield cells oblong in shape rather than round, while the feel of it will be soft and almost velvety.

Elasticity.—The loaf should be elastic so that if pressed rather firmly between the hands it will spring back to its original shape when the pressure is removed. This elasticity is also evident if the cut portion of a loaf is pressed with the fingers and shows no impression after the pressure is removed.

Flavor.—Above everything, however, ranks flavor, for bread is made to be eaten, and no matter how attractive in appearance with-in or without, the loaf which does not taste and smell good is not a desirable one. It should have the natural sweet, nutty flavor of the baked wheat grain, and there should be no suggestion of sourness or of rancid fat or anything else foreign to a good bread flavor.

Keeping qualities.—In most homes sufficient yeast bread is baked at one time to last for several days. It is very important, therefore, that this bread should keep well until all has been used. It should not mold when kept in a tightly closed bread box for three days, even at a temperature of 90° to 100° F. Nor should the interior of the loaf discolor, become soft or stringy, or develop an unpleasant taste or odor after a few days. Although bread naturally grows somewhat dry and stale when kept thus for several days, unusual dryness may be caused by having the dough too stiff when molded.

Score card for use at home.

	Points.
General appearance-----	10
Shape—roundness of "dome." ³	
Smoothness—no cracks, bulges, lumps, etc.	
Color of crust.	
Lightness-----	10
Crust-----	10
Thickness.	
Quality (crispness and elasticity).	

³ When several loaves are baked close together, either in separate pans placed near each other in the oven, or several loaves in the same pan, the symmetrical shape of the individual loaves is marred and allowance for same should be made.

Crumb:	Points.
Color	5
Texture—size and uniformity of cells, thinness of cell walls. No streaks or closeness next to crust.....	15
Elasticity—softness and springiness.....	10
Flavor—Taste and odor.....	30
Sweet, nutty flavor with no off-taste.	
Keeping qualities.....	10
See description above.	
Total.....	100

General score card for white bread.

1. General appearance:	
Shape	5
Smoothness of crust.....	5
Depth and evenness of color.....	5
2. Lightness.....	10
3. Crust:	
Thickness	5
Quality—crispness and elasticity.....	5
4. Crumb:	
Color.....	10
Texture—size and uniformity of cells, thinness of cell walls.....	15
Elasticity—softness and springiness.....	10
5. Flavor—Taste and odor.....	30
Total.....	100

Score card for mixed breads.

1. General appearance (form, smoothness of crust, uniformity and depth of color.....	15
2. Size and lightness of loaf.....	10
3. Crust (crispness, tenderness).....	10
4. Crumb—color.....	5
5. Crumb—texture (fineness and uniformity of grain).....	10
6. Crumb—elasticity (softness, pliability, springiness).....	10
7. Flavor and odor.....	40
Total.....	100

QUICK OR HOT BREADS.

In any of the following recipes sour milk or buttermilk and baking soda may be substituted for sweet milk (or water) and baking powder. To guard against an excess of soda, which causes a yellow color in the bread and a less agreeable flavor, use one-half *level* teaspoonful of soda to every *cupful* of sour milk. The soda may be sifted with the other dry ingredients, as is recommended when using baking powder, insuring thorough mixing.

In using either baking powder or sour milk and soda, all materials should be as cold as possible, especially the liquid, and in case of pastry and biscuits it is well also to keep the shortening cold, although it is not always necessary.

The mixing should be done as quickly as possible, especially after the baking powder is moistened, to minimize the loss of leavening gas. Biscuits should be rolled, cut, and placed in the pans as soon as possible after mixing. If necessary, they may stand in the pans before baking with comparative safety if kept cold.

Other sweetening agents may be used in place of sugar; for example, honey, maple, cane or sorghum sirup, molasses, or corn sirup. Honey will replace sugar, measure for measure; that is, one tablespoon or one cupful of honey may take the place of one tablespoon or one cupful of sugar. The other substances decrease in sweetening power in the order named. A slightly larger amount of these would therefore be required in lieu of a given measure of sugar. It must also be remembered that in the following recipes a reduction of $\frac{1}{4}$ cup of other liquid for every cup of sirup used must be made when liquid sweetening agents are used in place of sugar.

BISCUITS.

PLAIN BAKING-POWDER BISCUIT.

(10 small biscuits.)

2 cups sifted flour.	2 tablespoons shortening.
$\frac{3}{4}$ teaspoon salt.	$\frac{1}{2}$ to $\frac{3}{4}$ cup liquid (milk, water, or
2 teaspoons baking powder.	equal parts of each.

Sift together the flour, salt, and baking powder. Cut or chop the shortening into the flour with one knife or two, until well distributed. Finally, if necessary, rub the mixture between the tips of the fingers until it is like a meal. Add just enough cold liquid to make a soft dough that can be handled on the board, mixing with a knife if possible. Mix quickly and handle the dough very lightly. Place it on a floured board, roll to the thickness of $\frac{1}{2}$ inch, and cut into desired shape. Place the biscuits on a baking sheet or in shallow tins dusted lightly with flour, and bake in a rather hot oven 10 to 15 minutes or until thoroughly baked.

DROP BISCUITS.

To save time in preparation or when no cutter is at hand, the dough may be made somewhat softer than above and dropped on the tin by spoonfuls about one-half inch apart. The mixture, although soft, should be stiff enough not to spread on the tin, yet soft enough so that the biscuits when baked have a smooth, rounded surface rather than a rough, lumpy one. If desired, the top may be brushed with milk or smoothed gently with a knife dipped into water or milk. Bake as above.

These "emergency" or drop biscuits are not quite like the rolled ones, yet if of the proper consistency they are equally good. Indeed some excellent judges of pastry insist that they are always a little more tender.

SOUR-MILK BISCUIT.

(12 biscuits.)

2½ cups sifted flour.	1 teaspoon baking powder.
¾ teaspoon salt.	2 tablespoons shortening.
¾ teaspoon baking soda.	About ¾ cup sour milk or buttermilk.

Sift together the flour, salt, baking powder, and soda. Cut or chop in the shortening, add the sour milk, and mix as usual. Bake thoroughly in a hot oven about 10 to 12 minutes. Be sure that the milk is sufficiently sour to neutralize *all* the soda.

If desired, a drop biscuit may be made, using about one cup of the sour milk for mixing and one-half teaspoon soda.

WHOLE-WHEAT BISCUIT.

(10 biscuits.)

2 cups graham flour (or homeground wheat meal) measured before sifting.	2½ teaspoons baking powder.
¾ teaspoon salt.	1 or 2 tablespoons sweetening.
	2 tablespoons shortening.
	¾ to 1 cup liquid.

Mix as directed under baking-powder biscuit, returning the bran to the mixture after sifting and dissolving the sweetening (if used) in the liquid used for mixing. Roll slightly thinner than for plain biscuit and bake a little more slowly and thoroughly.

PEANUT BISCUIT.

Follow directions for plain baking-powder biscuit given on page 22, but add to the sifted mixture ½ to 1 cup of peanut meats, chopped or rolled fine. The addition of one or two teaspoons sweetening will improve the flavor of these biscuits.

PEANUT-BUTTER BISCUIT.

Replace all or part of the shortening in any of these recipes by peanut butter and proceed as usual. A little sugar, about 1 teaspoon, will improve the flavor.

POTATO BISCUIT.

(15 biscuits.)

2 cups sifted flour.	1 cup mashed potato (sweet or Irish).
1 teaspoon salt.	3 tablespoons shortening.
3 teaspoons baking powder.	Liquid sufficient to mix.

Sift together the flour, salt, and baking powder. Cut or rub into this the cold shortening. In the same way rub into this flour mixture the mashed potato. Finally, add just enough cold liquid to make the mass cling together. Do not knead. Place on floured board, roll until one-third inch thick, and cut into rounds. Place these in lightly floured biscuit tins and bake 15 to 20 minutes in a moderately hot oven. Bake all potato breads more slowly than those made with flour alone.

CORN-MEAL BISCUIT.

(10 to 12 biscuits.)

In recipe for plain biscuit use from ½ to 1 cup (scant) of cornmeal (measured before sifting) in place of an equal amount of flour and proceed as directed otherwise. Roll the dough slightly

thinner and bake the biscuits a little more slowly and thoroughly. If desired, the cornmeal may be scalded with a small amount of boiling water, $\frac{3}{4}$ cup boiling water to 1 cup of meal. Cover and let stand $\frac{1}{2}$ hour. Then proceed as directed for making potato biscuit.

Any other fine meal or flour may be used to replace part of the wheat flour in biscuit making.

SCORE CARD FOR HOT BISCUITS.

1. General appearance (shape, size and uniformity, color)-----	15
2. Lightness-----	10
3. Crust (depth and quality)-----	10
4. Crumb—color-----	5
5. Crumb—texture (tenderness, flakiness, grain)-----	20
6. Flavor—taste and odor-----	40
Total-----	100

MUFFINS AND GEMS.

PLAIN MUFFINS.

(15 small muffins.)

2 cups sifted flour.	1 tablespoon shortening (melted)
2 teaspoons baking powder.	1 egg.
$\frac{3}{4}$ teaspoon salt.	About 1 cup liquid (preferably milk)
1 tablespoon sweetening, if desired.	

Beat the egg until light, add a portion of the liquid and the sweetening if used. Mix this with the flour which has been sifted with the baking powder and salt. Add the melted shortening and sufficient liquid to make a smooth batter and beat well. Place mixture in greased muffin pans until about half full and bake 20 to 25 minutes in a moderate oven. If preferred, the white of the egg may be beaten separately and folded into the batter last.

WHOLE-WHEAT MUFFINS.

(15 small muffins.)

2 cups graham flour (measured before sifting) or part graham and part white flour.	1 or 2 tablespoons sweetening.
	1 tablespoon shortening (melted).
	1 egg.
2 $\frac{1}{2}$ teaspoons baking powder.	1 to 1 $\frac{1}{4}$ cups liquid.
$\frac{3}{4}$ teaspoon salt.	

Proceed as for making plain muffins, but add to the flour mixture the bran which remains after sifting the dry materials. A little more liquid is required for graham than for white flour. Bake longer and a little more slowly than plain muffins.

BRAN MUFFINS.

(12 muffins.)

1 cup flour.	$\frac{1}{4}$ to $\frac{1}{2}$ cup sweetening.
1 teaspoon salt.	1 tablespoon shortening (melted).
1 teaspoon soda.	1 $\frac{1}{2}$ to 2 cups sour milk.
2 cups clean bran.	$\frac{3}{4}$ cup seeded raisins or chopped nuts.

Sift together the flour, salt, and soda and mix with this the bran. Add together the sweetening, melted shortening, and part of the

milk; then mix with the dry materials. Add the raisins, dusted with flour and enough more sour milk to form a batter of such consistency that it will drop but not pour from the spoon but be as wet as possible otherwise. Bake in greased muffin pans about $\frac{1}{2}$ hour.

BRAN MUFFINS WITH BAKING POWDER.

(12 muffins.)

1 cup flour.	$\frac{1}{4}$ cup sweetening.
1 teaspoon salt.	1 egg.
3 teaspoons baking powder.	1 tablespoon shortening (melted).
2 cups clean bran.	About $1\frac{1}{2}$ cups sweet milk.

Sift together the flour, salt, and baking powder; blend with this the bran, and add to these dry ingredients the mixture of milk, beaten egg, sweetening, and shortening. Have a thick but very moist batter as described in preceding recipe for bran muffins. Bake in greased muffin pans in a moderate oven about $\frac{1}{2}$ hour.

THE USE OF CORN MEAL IN MUFFINS.

Various samples of corn meal differ greatly from each other not only in color but also in fineness of the particles, the presence or absence of noticeable portions of bran and germ, and the absorption of liquid.⁴ Southern corn meal is usually a stone-ground product, soft, smooth, and white. It is generally unbolted, but sometimes has the larger part of the coarse bran and germ removed. The unbolted, stone-ground meal has a rich, distinctive flavor much enjoyed by all who are accustomed to it.

In the North a yellow corn meal is preferred, and in the milling steel rolls are used in place of burrstones. In this steel-roller process of milling the corn is generally kiln-dried, then degerminated, and the meal is bolted. The product is fine and sharp, and owing to the kiln-drying and removal of the germ it keeps better than the stone ground, although it lacks something of the rich flavor of the latter. It has been found that the steel-roller ground meal requires about 10 per cent more liquid for cooking than the stone ground.

The roller-process meal, since it is both degerminated and bolted, is less rich in fat, in mineral ingredients, and in fibrous material than unbolted stone-ground meal.

CORN MUFFINS—SOUTHERN STYLE.

(15 small muffins.)

2 cups corn meal (measured before sifting).	1 egg.
$\frac{1}{4}$ teaspoon baking soda.	1 tablespoon shortening (melted).
$\frac{1}{4}$ teaspoon salt.	$1\frac{1}{2}$ to 2 cups sour milk or buttermilk.

Proceed as directed for whole-wheat muffins.

CORN-MEAL STICKS.

The batter for corn-meal muffins may also be baked in the iron bread-stick pans. Have the pans greased and sizzling hot; place one

⁴ See Farmers' Bul. 565, Cornmeal as a Food and Ways of Using It, p. 8.

good spoonful in each depression so that the latter is about two-thirds full; smooth the top of the mixture with a knife, if necessary, and bake in a rather quick oven about 25 minutes. Since they have a large proportion of crisp crust and comparatively little crumb, these cornsticks are liked by many who do not otherwise care for breads made entirely of corn meal.

If a corn-meal muffin of larger bulk and less granular in texture be desired, some wheat flour must be added to the meal, since mixtures made with corn meal alone do not rise as much as wheat-flour doughs. If in the recipe for corn-meal muffins—southern style, one-third or one-half of the meal were replaced by wheat flour, a noticeably larger and more porous muffin would result.

CORN MEAL AND WHEAT-FLOUR MUFFINS.

(15 small muffins.)

1 cup corn meal (measured before sifting).	1 tablespoon sweetening (more if desired).
1 cup wheat flour.	1 egg.
$\frac{1}{2}$ teaspoon salt.	1 tablespoon shortening (melted).
2 $\frac{1}{2}$ teaspoons baking powder.	About 1 cup milk.

Mix and bake as directed for whole-wheat muffins.

In a number of the Southern States soy beans or peanut flour may be obtained which is made by grinding the press cake left after expressing most of the oil from soy beans or peanuts. These flours are very nutritious, and when mixed with an equal amount or more of wheat flour, produce rich and appetizing breads. If the peanut flour be lightly browned or parched in the oven before using, it will yield a product of better flavor.

If these flours can not be purchased, the housewife may prepare the meals herself. Clean, dry soy beans may be ground in an ordinary food chopper or hand mill such as is used for preparing chicken feed. The coarse bran should be sifted out and the remaining meal ground to the desired fineness. The Mammoth Yellow or Haberlandt varieties of soy bean are especially desirable for this purpose.

Peanuts may be shelled, parched, and crushed with a rolling-pin or ground in a food chopper until reduced to a meal. This meal is delicious in muffins, bread, cookies, and in numerous other articles of food.

SOY-BEAN MUFFINS.

(15 small muffins.)

1 scant cup soy bean meal or flour.	1 or 2 tablespoons sweetening.
1 cup wheat flour.	1 tablespoon shortening (melted).
$\frac{1}{2}$ teaspoon salt.	1 egg.
2 $\frac{1}{2}$ teaspoons baking powder.	About 1 cup liquid.
$\frac{1}{2}$ cup raisins, or chopped dates, if desired.	

Blend the materials as directed for plain muffins, adding the fruit previously dusted with flour. Do not have this batter too soft, as it does not thicken as much in baking as that made with other flours.

PEANUT-FLOUR MUFFINS.

Proceed as for soy-bean muffins, using peanut flour in place of soy-bean meal or flour. The raisins or dates are a very agreeable addition although not necessary. Peanut butter may well be used as the shortening.

CORN-FLOUR MUFFINS.

If corn flour can be purchased, follow the directions for soy-bean muffins, using corn flour in place of soy-bean meal. The sweetening may be omitted. If desired, 2 tablespoons of shortening may be used in these.

BUCKWHEAT MUFFINS.

Any of the grains such as rye, buckwheat, barley, finely-ground oats, feterita, kafir corn, or milo maize, etc., in the form of meal or flour, may be used in place of the soy-bean meal in the recipe for soy-bean muffins. The raisins may be added or omitted as desired.



FIG. 5.—Potato muffins.

POTATO MUFFINS.

(12 to 15 muffins.)

1½ cups wheat flour.

¾ teaspoon salt.

3 teaspoons baking powder.

1 cup cooked sweet potato (Irish potatoes may be used instead).

1 or 2 eggs.

2 tablespoons shortening.

Liquid sufficient to make a rather stiff batter (about ½ cup).

Boil the potatoes in the skins until tender; drain, peel, and mash fine. Putting the potato through a ricer or colander is better than

mashing. Sift together the flour, salt, and baking powder. Beat the eggs until light and add to the cool mashed potato. Next add the melted shortening, then the flour mixture, alternating with portions of the liquid, until a batter is formed somewhat stiffer than for ordinary flour muffins. Drop by spoonfuls into greased muffin pans until half filled and bake about 30 minutes in a moderately hot oven.

RICE MUFFINS.

Substitute cooked rice for the cooked potato in the recipe for potato muffins.

Cooked breakfast cereals, such as very thick oatmeal or corn-meal mush, cooked soy-bean meal, cooked or baked dasheen, may be used in place of the mashed potato in the recipe for potato muffins. Unless the oatmeal mush be very thick it would be better to use of this $\frac{1}{2}$ to $\frac{3}{4}$ cup instead of 1 cup, as directed for potato, rice, etc.

CORN MEAL-POTATO MUFFINS.

(12 small muffins.)

1 cup corn meal.	1 tablespoon shortening (melted).
$\frac{3}{4}$ teaspoon salt.	1 or 2 eggs.
3 teaspoons baking powder.	$\frac{1}{2}$ cup liquid or more (enough to make
1 cup mashed potato.	a medium soft batter).
1 tablespoon sweetening, if desired.	

Mix as usual and bake very thoroughly one-half hour.

CORN MEAL-RICE MUFFINS

One cup of cooked rice may be used in place of the mashed potato in the recipe for corn meal-potato muffins.

BREAD MUFFINS.

(10 small muffins.)

$1\frac{1}{2}$ cups dry bread crumbs.	1 tablespoon shortening.
1 cup milk.	1 or 2 tablespoons sweetening.
$\frac{1}{2}$ teaspoon salt.	$\frac{1}{2}$ cup flour.
1 egg.	2 teaspoons baking powder.

Scald the milk, add the crumbs, allow to stand 15 minutes, then mash and beat to a paste. Add the salt, beaten egg yolk, melted shortening, sweetening, and the flour and baking powder sifted together. Finally, fold in the beaten egg white. Pour into gem pans until half filled, then bake about 20 minutes in a moderately hot oven.

SCORE CARD FOR MUFFINS.

Although the characteristics of muffins are different from those of hot biscuits, the points to be scored are practically identical. The same score card may therefore be used for both, with one difference: Under texture for biscuits there are the terms "tenderness, *flakiness*, and grain"; under texture for muffins use the terms "tenderness, *crumbliness*, and grain."

CORN MEAL-PUMPKIN DODGERS.

(10 to 12 cakes.)

1½ cups cooked pumpkin.	1 or 2 tablespoons sweetening.
1 teaspoon salt.	1½ cups cornmeal.
3 tablespoons shortening.	

To the pumpkin, which has been cooked very tender and mashed free from lumps, add the salt, sweetening, melted shortening, and corn meal, and mix thoroughly. Have the mixture just soft enough to take up by spoonfuls and pat into flat cakes in the hand. Place on a griddle or greased baking sheet and bake about 20 minutes in a hot oven.

If desired, the corn meal may be added to the hot pumpkin and allowed to steam with the latter for 10 minutes before adding the other ingredients.

SWEET POTATO-CORN MEAL DODGERS.

Substitute sweet potato for the pumpkin in the preceding recipe.

EGGLESS CORN BREAD.

(12 servings.)

2 cups corn meal.	¾ teaspoon baking soda, 1¼ to 1½ cups
1 teaspoon salt.	sour milk.
3 teaspoons baking powder, 1 cup sweet	1 or 2 tablespoons sweetening, if de-
milk, or	sired.
	2 tablespoons shortening.

Sift together the corn meal, salt, baking powder (or soda). Dissolve the sweetening in the milk and add this to the sifted dry ingredients. Finally, add the melted shortening, beat well, and pour into a greased shallow tin. Bake 25 to 30 minutes in a moderately hot oven. Some wheat flour may be used in place of part of the corn meal if desired.

BATTER OR SPOON BREAD.

(Serves six.)

1 cup corn meal.	2 cups water.
1 teaspoon salt.	2 eggs.
1 tablespoon shortening.	1 cup milk.

Place the meal, salt, shortening, and water in a double boiler and cook 10 minutes, stirring until smooth and thick. Allow to cool somewhat, then add the well-beaten eggs, and finally thin down to a batter with about one cup of milk. Beat well, pour into a greased pan or baking dish, and bake in a rather hot oven about 30 minutes.

BOSTON BROWN BREAD.

(3 small loaves.)

2 cups graham flour.	½ cup sirup or molasses.
1 cup corn meal.	1½ to 2 cups sour milk.
1 teaspoon salt.	1 tablespoon shortening (melted).
1 teaspoon soda.	¾ cup seeded raisins.

Sift together the dry materials, returning the bran to the flour mixture. Add together the sweetening, shortening, and $1\frac{1}{2}$ cups of sour milk (or buttermilk) and blend with the flour mixture to which the raisins have been added. If necessary, add a little more milk until a thick batter is formed. Beat well and place in greased tins, such as coffee or baking-powder cans, filling not more than two-thirds full. Place cover on cans and steam three hours. It is excellent when baked about five hours in a fireless cooker, especially when a hot radiator is used to keep the heat at sufficiently high pitch. If no radiator is used, the bread should be steamed one hour before putting into the fireless.

Rye flour, rye meal, or home-ground wheat meal may be used in place of graham flour.

In place of sour milk and soda one may use $1\frac{1}{2}$ cups of sweet milk and 3 teaspoons of baking powder. If molasses is used, $\frac{1}{4}$ teaspoon of soda should be added to neutralize the acid therein.

GRIDDLE CAKES AND THE LIKE.

CORN MEAL GRIDDLE CAKES.

(Serves six.)

$1\frac{1}{2}$ cups corn meal.	1 tablespoon shortening (melted).
1 cup boiling water.	1 teaspoon baking soda.
$\frac{3}{4}$ teaspoon salt.	1 egg.
1 or 2 tablespoons sweetening, if desired.	2 cups sour milk.
	$\frac{1}{2}$ cup wheat flour.

Scald the meal with the boiling water in which has been dissolved the salt; cover and allow to cool. When quite cool add to it the sweetening (if used), the shortening, the well-beaten egg, and part of the milk. Blend with this mixture the flour and soda sifted together and the remainder of the milk, or enough to make a batter which will pour easily but is not too thin. Beat thoroughly and bake on a hot griddle until well browned on both sides.

In place of sour milk and soda one may use sweet milk (or part water) and 3 teaspoons of baking powder.

POTATO-CORN MEAL GRIDDLE CAKES.

(Serves six.)

1 cup mashed potato.	1 egg.
1 cup corn meal.	$\frac{1}{2}$ cup flour.
1 teaspoon salt.	$2\frac{1}{2}$ teaspoons baking powder.
1 or 2 tablespoons sweetening.	About 1 cup liquid.
1 tablespoon shortening (melted).	

Add the salt, sweetening, and one-half cup milk or water to the mashed potato, then blend with this the corn meal. Heat and stir frequently until the meal is scalded or cooked for about 5 minutes. Remove from the fire and cool. When cold add to this mixture the shortening, the well-beaten egg, the flour and baking powder sifted

together, and enough liquid (milk or water) to make a batter which will pour easily but is not too thin. Bake slowly and thoroughly on a hot griddle.

BREAD GRIDDLE CAKES.

(Serves five.)

1½ cups dry bread crumbs.	1 tablespoon shortening.
1½ cups sweet milk.	1 egg.
½ teaspoon salt.	½ cup flour.
1 or 2 tablespoons sweetening, if desired.	2 teaspoons baking powder.

Scald the milk, add the crumbs, let stand 15 minutes, then mash and beat to a paste. Add the salt, sweetening, melted shortening, and well-beaten egg. Finally, add the flour and baking powder, which have been sifted together. Bake on a hot griddle until nicely browned on both sides.

In place of baking powder and sweet milk alone, one-half cup sweet milk may be used to moisten the crumbs and 1 cup of sour milk with one-half teaspoon baking soda for thinning and leavening the mixture.

WAFFLES.

(Serves four.)

2 cups sifted flour.	2 eggs.
3 teaspoons baking powder.	1 tablespoon shortening (melted).
¾ teaspoon salt.	1½ cups milk (or more).
2 teaspoons sugar, if desired.	

Sift together the flour, baking powder, salt, and sugar. Beat the eggs until light, separating whites and yolks if desired. To the beaten eggs (or yolks) add the shortening and part of the milk, and mix this with the dry materials. Beat thoroughly and add enough more milk (or water) to make a smooth batter about the consistency of thick cream. If the whites were beaten separately, fold them in last.

The waffle irons should be thoroughly clean and smooth. Heat both sides thoroughly and grease with a brush or swab dipped in liquid fat, or rub the iron with a piece of fat bacon rind. Place a spoonful of batter in each compartment of the griddle, near the center, close the irons and the batter will fill the compartments. Bake on one side until the edges seem to be browning, then turn the iron and bake the other side until delicately brown.

CORN-MEAL WAFFLES.

In recipe for plain waffles use 1 scant cup corn meal and 1 cup wheat flour in place of all wheat flour. Proceed otherwise as directed there. These waffles are especially crisp and delicate.

RICE WAFFLES.

(Serves four.)

1 cup sifted flour.	1 cup cooked rice.
3 teaspoons baking powder.	2 eggs.
$\frac{1}{2}$ teaspoon salt.	1 tablespoon shortening (melted).
2 teaspoons sugar, if desired.	About $\frac{3}{4}$ cup milk.

Cook the rice until very soft and while hot mash it to a pulp. When cool add to it the melted shortening, the beaten egg yolks, and $\frac{1}{4}$ cup of milk. Add to this the flour which has been sifted with the baking powder, salt, and sugar. Beat thoroughly and lastly fold in the stiffly beaten egg whites. If necessary, add more milk to make a batter which will pour easily.

It is not necessary in making waffles to separate the whites and yolks of the eggs.

STRAWBERRY SHORTCAKE.

(Serves five.)

2 cups sifted flour.	4 tablespoons shortening (preferably
3 teaspoons baking powder.	butter or butter substitute).
$\frac{1}{2}$ teaspoon salt.	About $\frac{3}{4}$ cup milk or 1 or 2 tablespoons
1 tablespoon sugar.	less of water.

Sift together the flour, baking powder, salt, and sugar. Cut in the shortening and mix lightly with milk or water until like biscuit dough. Divide into two equal portions and roll each into a sheet about $\frac{1}{2}$ inch thick. Bake in shallow pan, one sheet upon the other, after spreading the lower lightly with butter. Or, cut the dough, after rolling, into rounds as for biscuit, placing two rounds upon each other separated by a thin layer of butter.

After baking in a rather hot oven about 15 minutes, separate the two layers. Spread each with butter and well-sweetened berries. Serve with whipped cream.

Other fruits, such as fresh red raspberries, dewberries, sliced peaches, oranges, stewed dried fruits, or stewed rhubarb, are excellent for shortcake.

VARIATIONS OF BISCUIT DOUGH.

As will be noticed, the recipe for shortcake is merely a variation of plain biscuit dough, having a larger amount of shortening and the addition of a small amount of sugar. Still other variations may be made.

PIN WHEELS.

Use baking-powder biscuit recipe with addition of 2 tablespoons sugar and an extra tablespoon of flour if needed. Roll to $\frac{1}{4}$ inch thickness. Brush over with melted butter and sprinkle with fruit (currants, raisins, or citron), or with cinnamon and sugar alone. Roll like a jelly roll and cut off pieces $\frac{1}{2}$ inch in thickness. Bake same as biscuits.

COFFEE CAKE.

In the recipe for plain biscuits add 2 tablespoons of sugar to the dry ingredients and one egg, well-beaten, to the liquid and mix as usual. Roll or pat into a sheet $\frac{1}{2}$ inch thick and place in greased pan. Dot top with bits of butter and strew with sugar and a little cinnamon. Bake in rather hot oven. This dough may be baked in two sheets and used for shortcake, making a somewhat richer cake.

DUTCH APPLE CAKE.

Prepare dough same as for coffee cake. After placing in pan, cover top with tart apples sliced $\frac{1}{4}$ inch thick, set close together and slightly overlapping. Strew generously with sugar, dust with cinnamon, and dot with bits of butter. Bake in a moderate oven until apples are very tender.

Other fruits such as sliced peaches, plums, raspberries, cherries, and stewed dried fruits may be used in place of the apples in this recipe.

PASTRY.

PLAIN PIE CRUST.

(Two crusts.)

1 $\frac{1}{2}$ cups sifted flour.

$\frac{1}{2}$ teaspoon salt.

$\frac{1}{2}$ teaspoon baking powder, if desired.

6 tablespoons shortening.

Cold water to mix.

Sift together the flour, salt, and baking powder (if used). Reserve 1 tablespoon of shortening until later, and cut or chop the remainder of the cold shortening into the flour until the mixture is like meal. Mix with water as cold as possible until a rather stiff dough is formed. Divide the dough into two parts, rolling the first and fitting it into the greased or flour-dusted pie tin. Do not stretch the dough when placing it in the pan as it shrinks in baking.

Roll the dough for the upper crust into a long sheet and spread lightly with the tablespoonful of shortening which was reserved. Dust with flour, fold the dough into thirds, and roll into shape. Fold over in the middle and slash several times at the fold. Open out the sheet, fold over crosswise, and slash again at the fold. Then place on the pie. Trim closely to the plate and press top and lower crusts together. Bake in a hot oven.

Pastry is more flaky if chilled before rolling.

If the filling is very moist, it is better to bake the lower crust in a hot oven about 5 minutes, or until just beginning to color, before adding the filling.

The following recipe and directions for economical plain paste have been contributed by Dr. Minna C. Denton, Assistant Chief of the Office of Home Economics, Department of Agriculture.

ECONOMICAL PLAIN PASTE.

1½ cups sifted flour.

½ teaspoon salt.

4½ to 6 tablespoons fat.

3 tablespoons water.

Take out 2 or 3 tablespoons of this flour for use on board. Cut or chop shortening and salt into remainder of flour with knife or fork, using tips of fingers toward the close of the mixing process, if desired; work until the mixture is like meal. Make a well in center of mixture, pour in slowly 3 tablespoons of water, stir (or beat with back of spoon) into a mass or loose ball which can be turned out on to a lightly floured board.

(Do *not* use more than 3 tablespoons water, for that will make your pie crust tough when so small an amount of fat is used. An extra tablespoonful of water will harden this crust, especially if you are using a hard-winter or spring-wheat flour.)

Divide paste into two portions, the one for the lower crust being a little more than half of the whole mass; since the lower crust needs to be thicker than the upper, in order to hold firm. Roll the larger to fit the pie tin, being careful not to stretch or knead the dough, nor handle it more than is absolutely necessary. Fit into the pie tin and add filling. Roll upper crust, cut several holes for escape of steam, place on pie, trim at edge of plate, press edges of two crusts together. Bake in hot oven, about 35 minutes, reducing the heat somewhat in the latter half of the baking period.

This paste, if properly handled, even with only 4½ tablespoons fat, makes a fairly tender crust which is quite satisfactory for apple, chocolate, lemon, peach, or mince pie; in short, for all except the very juicy pies such as cherry, rhubarb, and berries. These juicy fillings are better if baked in a richer crust, made with 6 or 7 tablespoons of fat to 1½ cups of flour. Three tablespoons of water for mixing the paste will be found sufficient in each of these cases, when once you become accustomed to handling paste made with little water. As the amount of fat is increased, however, a slight increase in the amount of water used does not do so much harm; the excess water is less likely to toughen the crust when there is plenty of fat.

This paste should be quickly and lightly mixed. It is not necessary that the ingredients be cold in crusts containing small amounts of fat. Both fat and water may be warm or even hot; in fact, some workers prefer to use melted fat. However, the crusts made with hot water or melted fat will be mealy rather than flaky, especially when much fat is used. Yet these mealy crusts are often tender and good.

Crusts in which 5 tablespoons of fat or more are used to the cup of flour should be thoroughly chilled. Any fat which is bland or tasteless or agreeable in flavor may be used, as lard, vegetable lards, and vegetable oils. However, do not use more than 4 tablespoons oil

to the cup of flour. Any wheat flour may be used, either bread or pastry, though the results are a little different in the two cases. It is easier to handle pastry flour with a small amount of fat and water than it is to similarly handle bread flour.

If the pie tin is a small one, only 7 or 8 inches in diameter, 1 cup of flour will be sufficient for 2 crusts and will require 3 or 4 tablespoons of fat and 2 tablespoons of water. If it is of generous size (over 9 inches), use $1\frac{3}{4}$ cups of flour with 5 or 6 tablespoons of fat and 3 tablespoons of water, or a very little more.

APPLE PIE.

Line a pie tin with pastry and fill with thinly sliced tart apples. Strew generously with sugar, $\frac{1}{4}$ to $\frac{1}{2}$ cup, dust lightly with cinnamon and nutmeg if desired, and dot with bits of butter. If the apples are very dry they may be plunged into boiling water before placing in the pie, or 2 tablespoons of water may be poured over the apples. Cover with top crust and place in a hot oven for 5 to 10 minutes. When the crust begins to color slightly, reduce the temperature and continue the baking at a moderate temperature until the apples are very tender, about 35 minutes in all.

CHOCOLATE CREAM PIE.

(Serves five or six.)

Prepare filling from following:

2 cups milk.	2 ounces grated chocolate (or 4 table-
$\frac{1}{4}$ teaspoon salt.	spoons powdered cocoa).
$\frac{1}{2}$ cup sugar.	2 egg yolks.
4 tablespoons cornstarch.	1 teaspoon vanilla.
	2 egg whites for meringue.

Cook until thick enough to pile. Prepare a single crust for this pie by rolling the dough for it on the outside of an inverted pie tin which has been lightly dusted with flour beforehand. When baked for 5 minutes this shell may be slipped off and placed inside the pie tin, ready for the filling. This is a good way to prepare a perfectly smooth and well-fitting lower crust for pies which are to hold liquid or semiliquid fillings. Add the filling. Place in hot oven until filling just bubbles. Remove from the oven and spread over the pie the stiffly beaten egg whites mixed with 2 to 3 tablespoons sugar. Return to the oven until the meringue is delicately browned on top.

SWEET-POTATO PIE.

(Serves five or six.)

2 cups cooked sweet potato.	1 to 2 cups milk.
$\frac{1}{4}$ teaspoon salt.	Spice to taste, or
$\frac{1}{2}$ cup brown sugar, or	$\frac{1}{2}$ teaspoon cinnamon.
$\frac{1}{4}$ cup sirup or molasses.	$\frac{1}{4}$ teaspoon allspice.
2 eggs.	$\frac{1}{2}$ teaspoon cloves.
1 tablespoon butter (melted).	

Mash the potatoes or put through a ricer while hot. Add the salt, sweetening, the spice, melted shortening, the well-beaten eggs, and milk enough to make a smooth batter not too thin. Bake a single crust lightly, add the filling, and put back into the oven until crust is thoroughly baked.

SQUASH PIE.

Cooked Hubbard squash may be used in place of the sweet potato in the preceding recipe.

USES FOR LEFT-OVER PASTRY.

In the making of pies a small portion of dough, insufficient for another pie, is frequently left over. This may be utilized in various ways as follows:

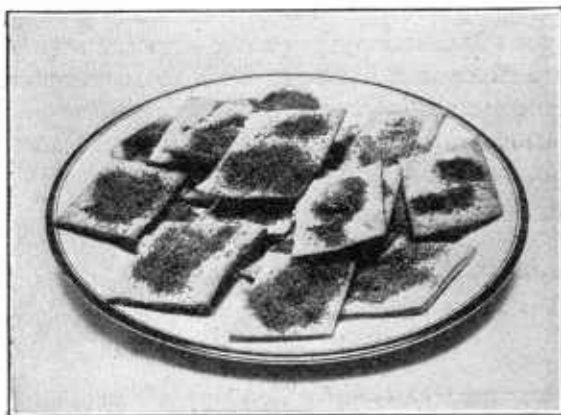


FIG. 6.—Pastry crisps with sugar and cinnamon.

PASTRY CRISPS.

The dough may be simply rolled thin, cut into squares, sprinkled with sugar and cinnamon, and baked until crisp. These are very nice to serve with sauce or other dessert, and are more economical of time and money than are most cookies or cake.

ROLY-POLY.

Roll pastry until about $\frac{1}{4}$ inch in thickness, cover with dried currants or with fresh blackberries, raspberries, or blueberries well sweetened, sprinkle with flour, and then roll like a jelly roll. Bake in a moderately hot oven until well done. Serve with liquid sauce.

CHEESE STRAWS.

Roll pastry thin, cover with grated cheese or with a highly seasoned soft cheese; fold into thirds and roll again into a thin, long sheet. Cut into narrow strips and bake in a hot oven until delicately browned. These are nice to serve with salads.

PASTRY SHELLS.

Bake pastry in or on the outside of muffin pans and fill these shells with jam, preserves, or well-sweetened stewed fruit. With or without the addition of whipped cream these form a delicious dessert.

These shells may be filled with creamed chicken, creamed peas, etc., adding an attractive dish for another meal.

COOKIES.

PLAIN ROLLED COOKIES.

(About 60 cakes.)

1 cup sugar.
 $\frac{1}{2}$ cup shortening.
 1 egg.
 1 teaspoon flavoring extract.

3 cups sifted flour.
 2 teaspoons baking powder.
 $\frac{1}{2}$ teaspoon salt.
 About $\frac{1}{2}$ cup milk.

Cream together the sugar and shortening; add to this the well-beaten egg, the flavoring extract, and the flour, sifted together with the salt and baking powder. Add sufficient milk (or water) to form a dough just stiff enough to roll on the board without sticking. Roll thin, from $\frac{1}{8}$ to $\frac{1}{4}$ inch in thickness, and cut into desired shape. Bake in a rather hot oven until delicately browned, about 10 to 12 minutes.



FIG. 7.—Individual pastry shells as a dessert. These shells make left-over sweets or creamed meats and vegetables go farther.

PLAIN DROP COOKIES.

Add enough liquid in preceding recipe to make a dough which will barely drop from the spoon but which will spread slightly and form a smooth cookie. The dough should not be so soft, however, that the cookies lose their shape and spread over the entire pan. Drop by spoonfuls onto a greased baking sheet and bake in a moderately hot oven about 15 minutes.

SPICE COOKIES.

In the recipe for plain rolled or plain drop cookies omit the flavoring extract and sift with the flour 2 teaspoons cinnamon, 1 teaspoon allspice, and $\frac{1}{2}$ teaspoon cloves, or 1 tablespoon ginger and 2 teaspoons cinnamon.

CHOCOLATE COOKIES.

In recipe for plain cookies add 2 ounces chocolate (melted) or 4 tablespoons powdered cocoa, with 1 teaspoon vanilla extract.

RAISIN OR NUT DROP COOKIES.

In recipe for plain drop cookies add $\frac{3}{4}$ cup seeded raisins or $\frac{3}{4}$ cup chopped nuts dredged with flour.

RICH COOKIES.

1 cup sugar.	2 $\frac{1}{4}$ cups flour.
$\frac{3}{4}$ cup butter.	2 teaspoons baking powder.
2 eggs.	$\frac{1}{4}$ teaspoon salt.
1 tablespoon water.	Spice or flavor to suit taste.

Mix as directed for plain cookies. This dough will be about the consistency for drop cookies. If a rolled cookie is desired, omit the water and use 3 cups of flour or enough to make a dough stiff enough to roll thin. Cut and bake as usual. Dried fruits, nuts, etc., may be added if desired.

MOLASSES COOKIES.

(About 60 cakes.)

1 cup molasses.	1 teaspoon baking powder.
$\frac{1}{2}$ cup sugar.	$\frac{1}{2}$ teaspoon soda.
$\frac{1}{2}$ cup butter or butter substitute.	2 teaspoons ginger.
1 egg.	2 teaspoons cinnamon.
About 3 cups flour (more if necessary).	1 teaspoon allspice.
$\frac{1}{2}$ teaspoon salt.	

Cream together the sugar, shortening, and molasses and add the well-beaten egg. Sift together the flour, salt, baking powder, baking soda, and spice. Blend the dry ingredients with the molasses mixture. For rolled cookies have dough just stiff enough to roll on board without sticking. For drop cookies have the dough soft enough to barely drop from the spoon as directed for drop cookies.

In general these cookies will be more crisp if the molasses and shortening are heated together until the mixture just boils.

CORN-MEAL COOKIES.

(About 60 cakes.)

1 $\frac{1}{2}$ cups sifted flour.	$\frac{1}{2}$ cup sirup.
1 $\frac{1}{2}$ cups fine corn meal.	$\frac{1}{2}$ cup sugar.
$\frac{3}{4}$ teaspoon salt.	1 egg.
2 teaspoons baking powder.	1 teaspoon vanilla.
$\frac{1}{4}$ teaspoon soda.	Milk enough to mix.
$\frac{1}{2}$ cup shortening.	

Cream together the sugar, shortening, and sirup. Add the well-beaten egg, the vanilla, and the flour which has been sifted together with the corn meal, baking powder, salt, and soda. Add just enough milk to make a dough stiff enough to roll without sticking. Roll very thin, cut into desired shape, and bake in a moderately hot oven 10 to 12 minutes or until delicately browned.

PEANUT COOKIES.

(About 50 cakes.)

2 cups sifted flour.	$\frac{1}{2}$ cup shortening.
1 cup roasted peanut meats, blanched and crushed.	$\frac{1}{2}$ cup sirup.
$\frac{3}{4}$ teaspoon salt.	$\frac{1}{2}$ cup sugar.
2 teaspoons baking powder.	1 egg.
$\frac{1}{4}$ teaspoon soda.	Milk sufficient to mix.

Mix, roll, and bake as directed for corn-meal cookies. If desired, add milk enough to make a softer dough and drop by teaspoonfuls onto the greased baking sheet. Bake these drop cookies more slowly and a little longer than the rolled cookies.

COCONUT COOKIES.

In recipe for peanut cookies use shredded coconut in place of the crushed peanuts.

OATMEAL DROP CAKES.

(About 50 cakes.)

$\frac{3}{4}$ cup sirup.	1 cup sifted flour.
$\frac{1}{4}$ cup brown sugar.	$\frac{1}{2}$ teaspoon salt.
$\frac{1}{2}$ cup shortening.	2 teaspoons baking powder
1 egg.	$\frac{3}{4}$ cup seeded raisins.
2 cups rolled oats.	

Mix in the usual way and drop by teaspoonfuls onto a greased baking sheet 1 inch apart. Bake in a moderate oven about 15 minutes or until delicately browned.

OATMEAL MACAROONS.

(About 20 cakes.)

1 egg.	$1\frac{1}{2}$ cups rolled oats.
$\frac{1}{2}$ cup brown sugar (white may be used).	$\frac{1}{2}$ teaspoon baking powder.
1 tablespoon butter or butter substi- tute.	$\frac{1}{4}$ teaspoon salt.

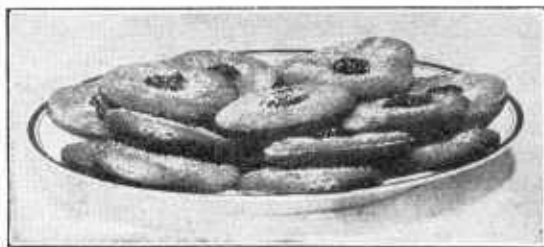
Cream together the sugar and shortening, add the beaten egg yolk, the salt, rolled oats, and baking powder. Lastly, fold in the stiffly beaten egg white. Drop by teaspoonfuls on a greased baking sheet, about 1 inch apart, and smooth the top with a knife dipped in cold water. Bake in a rather hot oven until delicately browned. If desired, the egg may be beaten without separating yolk and white.

CHRISTMAS CAKES.

(60 cakes.)

1 cup of sugar.	2 teaspoons baking powder.
$\frac{3}{4}$ cup butter or butter substitute.	$\frac{1}{4}$ teaspoon salt.
2 eggs.	2 teaspoons cinnamon.
1 tablespoon water.	$\frac{3}{4}$ cup seeded raisins.
$2\frac{1}{2}$ cups sifted flour.	$\frac{3}{4}$ cup chopped nuts.

Cream together the sugar and shortening; add the well-beaten eggs, the water, and the flour sifted together with the salt, baking powder, and cinnamon. Lastly, add the raisins and nuts well dusted with flour. Mix thoroughly and drop by teaspoonfuls on a greased baking sheet about 1 inch apart. Bake in a moderate oven 15 to 20 minutes or until delicately browned.



(a)



(b)

FIG 8.—(a) Simple cookies decorated with raisins and sugar. (b) Simple cookies decorated with peanuts.

FANCY COOKIES.

It is a very simple matter to prepare fancy cookies. The top may be decorated by pressing onto it before baking a

plump raisin or pieces of other dried fruit and dusting lightly with sugar. Ground nuts may be strewn over the top, or halves of nuts, such as pecans, English walnuts, peanuts, etc., be pressed onto the surface either singly or in form of a design.

Again, the cookies may be coated with a plain icing when they come from the oven and halves of nuts or fancy forms in the shape of stars, diamonds, etc., cut from fruit paste may be used to further decorate the cookies. The plain icing may be mixed with shredded coconut, ground nuts, or a mixture of nuts and dried fruits and spread on top or between two plain cookies. Marshmallow frosting, soft chocolate frosting, maple frosting, etc., may all be used as a filling between cookies. In fact, the housewife may imitate a number of the fancy cakes of the confectioner if she wishes to spend a little extra time and care on her baking.

